

Chapter NR 484

INCORPORATION BY REFERENCE

NR 484.01 Applicability; purpose.
 NR 484.02 Definitions.
 NR 484.03 Code of federal regulations.
 NR 484.04 Code of federal regulations appendices.

NR 484.05 National technical information service.
 NR 484.06 Other government organizations.
 NR 484.10 American Society for Testing and Materials.
 NR 484.11 Other private organizations.

NR 484.01 Applicability; purpose. c1d APPLICABILITY. This chapter applies to all air contaminant sources governed by chs. NR 400 to 499 and to their owners and operators.

c2d PURPOSE. This chapter is adopted under ss. 227.21 c2d and 285.11, Stats., to incorporate by reference testing, monitoring and other technical standards, established by the federal government and technical societies and organizations, to which reference is made in chs. NR 400 to 439 and 445 to 499.

Note: Technical Standards to which reference is made in ch. NR 440 are incorporated by reference in s. NR 440.17.

History: Cr. Register, September, 1986, No. 369, eff. 10-1-86; am. Register, September, 1987, No. 381, eff. 10-1-87; am. Register, February, 1990, No. 410, eff. 3-1-90; am. Register, May, 1992, No. 437, eff. 6-1-92; am. c2d, Register, February, 1995, No. 470, eff. 3-1-95; correction in c2d made under s. 13.93 c2md cbd 7., Stats., Register, January, 1997, No. 493.

NR 484.02 Definitions. The definitions contained in ch. NR 400 apply to the terms used in this chapter.

History: Cr. Register, September, 1986, No. 369, eff. 10-1-86.

NR 484.03 Code of federal regulations. The federal regulations in effect on March 1, 2006 listed in the first column of Table 1 are incorporated by reference for the corresponding sections of chs. NR 400 to 439 and 445 to 499 in the third column of Table 1.

Note: Copies of these materials are available for inspection in the offices of the department of natural resources and legislative reference bureau, Madison, Wisconsin and in some public libraries or may be purchased for personal use from:

Superintendent of Documents
 PO Box 371954
 Pittsburgh PA 15250-7954

Table 1
CFR References

CFR Reference	Title	Incorporated by Reference For
c1d 29 CFR part 1910 subpart Z	Toxic and Hazardous Substances	NR 465
c2d 29 CFR 1910.145cddc4d		NR 447.12 c4d cad 2. NR 447.14 c2d cad 2. NR 447.17 c2d cad 2.
c3d 29 CFR 1910.1001cjdc4dciid		NR 447.13 c1d cad 4.
c4d 29 CFR 1926.1101ckdc8dciid		NR 447.13 c1d cad 4.
c5d 40 CFR part 53	Ambient Air Monitoring Reference and Equivalent Methods	NR 400.02 c123ed and c123sd NR 404.06 c3d cbd
c6d 40 CFR 63.457	Test methods and procedures	NR 464
c7d 40 CFR part 75	Continuous Emission Monitoring	NR 446.18 c1d cad and ccd

History: Cr. Register, December, 1988, No. 396, eff. 1-1-89; am. c3d, Register, September, 1989, No. 405, eff. 10-1-89; renum. from NR 484.06, Register, February, 1990, No. 410, eff. 3-1-90; am. cintro.d and c3d, cr. c6d, Register, August, 1991, No. 428, eff. 9-1-91; am. cintro.d, r. c2d and c4d, renum. c1d, c3d, c5d and c6d to be c3d, c1d, c2d and c5d and am. c1d and c5d, c3d renum. from NR 484.04 c3d and am., Register, May, 1992, No. 437, eff. 6-1-92; renum. c5d to be c6d and am., cr. c5d, Register, May, 1993, No. 449, eff. 6-1-93; am. cintro.d and c5d, Register, June, 1994, No. 462, eff. 7-1-94; r. and recr. Register, February, 1995, No. 470, eff. 3-1-95; r. c5d and c6d, Register, December, 1995, No. 480, eff. 1-1-96; am. cintro.d, Register, March, 1997, No. 495, eff. 4-1-97; am. cintro.d and c4d, Register, November, 1999, No. 527, eff. 12-1-99; CR 00-160: am. Table 1, Register August 2001, No. 548, eff. 9-1-01; CR 00-175: am. cintro.d and Table 1 Register March 2002 No. 555, eff. 4-1-02; CR 02-146: am. c3d and c4d Register October 2003 No. 574, eff. 11-1-03; CR 05-040: am. cintro.d Register February 2006 No. 602, eff. 3-1-06; CR 07-036: cr. c7d Register November 2008 No. 635, eff. 12-1-08; CR 07-082: am. c5d Register September 2009 No. 645, eff. 10-1-09; CR 10-050: am. c5d Register November 2010 No. 659, eff. 12-1-10.

NR 484.04 Code of federal regulations appendices. The appendices to federal regulations in effect on August 1, 2016 listed in the first column of Table 2 are incorporated by reference for the corresponding sections of chs. NR 400 to 439 and 445 to 499 or code of federal regulations appendix method listed in the third column of Table 2. Since some of these materials are incorporated by reference for another appendix of the code of federal regulations and the other appendix is also incorporated by refer-

ence in this section, the materials listed in this section which are incorporated by reference for the other appendix are hereby also incorporated by reference and made a part of this chapter.

Note: Copies of these materials are available for inspection in the offices of the department of natural resources and legislative reference bureau, Madison, Wisconsin and in some public libraries or may be purchased for personal use from:

Superintendent of Documents
 PO Box 371954
 Pittsburgh PA 15250-7954

Table 2
CFR Appendix References

	CFR Appendix Referenced	Title	Incorporated by Reference For
c1d	29 CFR 1926.58 Appendix G	Work Practices and Engineering Controls for Small-Scale, Short-Duration Asbestos Renovation and Maintenance Activities—Non-Mandatory	NR 447.02 c18d Note
c2d	40 CFR part 50 Appendices A to N		NR 404.02 c8d NR 404.06 c2d
c4d	40 CFR part 50 Appendix H	Interpretation of the 1-Hour Primary and Secondary National Ambient Air Quality Standards for Ozone	NR 404.04 c5d cad
c4md	40 CFR part 50 Appendix I	Interpretation of the 8-hour Primary and Secondary National Ambient Air Quality Standards for Ozone	NR 404.04 c5d cbd
c5d	40 CFR part 50 Appendix J	Reference Method for the Determination of Particulate Matter as PM ₁₀ in the Atmosphere	NR 400.02 c123sd
c6d	40 CFR part 50 Appendix K	Interpretation of the National Ambient Air Quality Standards for Particulate Matter	NR 404.04 c8d ccd
c6gd	40 CFR part 50 Appendix L	Reference Method for the Determination of Particulate Matter as PM _{2.5} in the Atmosphere	NR 400.02 c123ed NR 404.04 c9d
c6rd	40 CFR part 50 Appendix N	Interpretation of the National Ambient Air Quality Standards for PM _{2.5}	NR 404.04 c9d
c6td	40 CFR part 50 Appendix P	Interpretation of the Primary and Secondary National Ambient Air Quality Standards for Ozone	NR 404.04 c5d ccd
c6vd	40 CFR part 50 Appendix R	Interpretation of the National Ambient Air Quality Standards for Lead	NR 404.04 c7d cbd
c7d	40 CFR part 50 Appendix S	Interpretation of the National Ambient Air Quality Standards for Nitrogen Dioxide	NR 404.04 c6d cad
c7md	40 CFR part 50 Appendix T	Interpretation of the National Ambient Air Quality Standards for Sulfur Dioxide	NR 404.04 c2d cad
c7sd	40 CFR part 50 Appendix U	Interpretation of the Primary and Secondary National Ambient Air Quality Standards for Ozone	NR 404.04 c5d cdd
c8d	40 CFR part 51 Subpart S, Appendix E	Transient Test Driving Cycle	NR 485.02 c22d
c9d	40 CFR part 51 Appendix M	Recommended Test Methods for State Implementation Plans	NR 439 NR 460.06 c4d cbd cintro.d NR 465.09 c4d cbd 1. and 2. NR 465.22 c25d, c29d and c31d NR 465.25 c3d ckd 4. and 5. a. and b. NR 465.28 c6d cbd 1. a., b. and d. and 2. a., b. and c. and Table 1 of subch. III of ch. NR 465 subchs. IV and V of ch. NR 465 NR 466.09 c5d NR 466.24 c3d cfd 1. and 2.
c10d	40 CFR part 51 Appendix S, Section IV	Sources That Would Locate in a Designated Nonattainment Area	NR 405.11 c1d ced
c11d	40 CFR part 51 Appendix W	Guideline on Air Quality Models cRevisedd	NR 405.10 NR 489.09 c3d cintro.d
c11md	40 CFR part 51 Appendix Y	Guidelines for BART Determinations Under the Regional Haze Rule	NR 433.03 c1d NR 433.04 c2d NR 433.05 c1d ccd
c12d	40 CFR part 58 Appendix B	Quality Assurance Requirements for Prevention of Significant Deterioration cPSDd Air Monitoring	NR 405.11 c3d
c13d	40 CFR part 60 Appendix A	Test Methods	NR 400.02 c131d NR 419.045 c5d cad and cbd NR 423.037 c9d ccd 1r. NR 428.25 c1d cbd 4. NR 439 NR 460 to 469
c14d	40 CFR part 60 Appendix A, Method 3	Gas Analysis for the Determination of Dry Molecular Weight	NR 449.09 c6d cad 3.

Table 2 (Continued)

CFR Appendix References

	CFR Appendix Referenced	Title	Incorporated by Reference For
c15d	40 CFR part 60 Appendix A, Method 5	Determination of Particulate Emissions from Stationary Sources	40 CFR part 61 Appendix B, Method 101 NR 462 Table 5
c15md	40 CFR part 60 Appendix A, Method 7, 7A, 7B, 7C, 7D and 7E	Determination of nitrogen oxide emissions from stationary sources	NR 428.23 c1d cbd 3. a. NR 428.08 c2d cgd 4. a.
c16d	40 CFR part 60 Appendix A, Method 18	Measurement of Gaseous Organic Compound Emissions by Gas Chromatography	NR 400.02 c77d NR 419.045 c2d cad 2. NR 422.142 c5d cad NR 422.143 c7d cad NR 469.01 c1d cad
c16md	40 CFR part 60 Appendix A, Method 19	Determination of sulfur dioxide removal efficiency and particulate, sulfur dioxide and nitrogen oxides emission rates	NR 428.23 c1d cbd 2. d., 5. a. and b. and 6. b.
c17d	40 CFR part 60 Appendix A, Method 21	Determination of Volatile Organic Compounds Leaks	NR 419.045 c5d ced NR 420.02 c39md NR 421.02 c21d NR 421.05 c2d ced NR 421.06 c2d ced
c18d	40 CFR part 60 Appendix A, Method 22	Visual Determination of Fugitive Emissions from Material Sources and Smoke Emissions from Flares	NR 415.075 c3d ced NR 460, Appendix DDDDD
c19d	40 CFR part 60 Appendix A, Method 25	Determination of Total Gaseous Nonmethane Organic Emissions as Carbon	NR 422.142 c5d cad NR 422.143 c7d cad
c20d	40 CFR part 60 Appendix A, Method 25A	Determination of Total Gaseous Organic Concentration Using a Flame Ionization Analyzer	NR 422.142 c5d cad NR 422.143 c7d cad
c20ed	40 CFR part 60 Appendix A, Method 25D	Determination of Volatile Organic Concentration of Waste Samples	NR 419.045 c5d cfd 6.
c20md	40 CFR part 60 Appendix A, Method 29	Determination of Metals Emissions from Stationary Sources	NR 446.04 c1d ccd 1. a. NR 446.08 c1d ccd 1. NR 462 Table 5
c20sd	40 CFR part 60 Appendix A, Method 30A	Determination of Total Vapor Phase Mercury Emissions from Stationary Sources	NR 446.04 c1d ccd 1. a. NR 446.08 c1d ccd 1.
c20td	40 CFR part 60 Appendix A, Method 30B	Determination of Total Vapor Phase Mercury Emissions from Coal-Fired Combustion Sources Using Carbon Sorbent Traps	NR 446.04 c1d ccd 1. a. NR 446.08 c1d ccd 1.
c21d	40 CFR part 60 Appendix B	Performance Specifications	NR 405 NR 408 NR 428 NR 439 NR 460 to 469
c21md	40 CFR part 60 Appendix F	Quality Assurance Procedures	NR 428.23 c1d cbd 2. c. NR 466.10 c2d NR 466.24 c2d cdd 1. b.
c21sd	40 CFR part 61 Subpart M, Appendix A	Interpretive Rule Governing Roof Removal Operations	NR 447.08 c1d camd
c22d	40 CFR part 61 Appendix A	National Emission Standards for Hazardous Air Pollutants: Compliance Status Information	NR 447.16 c2d
c23d	40 CFR part 61 Appendix B	Test Methods	NR 400.02 c131d NR 439 NR 446 to NR 469

Table 2 (Continued)
CFR Appendix References

CFR Appendix Referenced	Title	Incorporated by Reference For
c24d 40 CFR part 63, Subpart KK, Appendix A	Data Quality Objective and Lower Confidence Limit Approaches for Alternative Capture Efficiency Protocols and Test Methods	NR 439.06 c3d camd NR 465.09 c4d cbd 3. NR 465.25 c1d cbd 9. a. NR 465.28 c6d cbd 3. NR 465.35 c1d ccd 9. a. NR 465.38 c6d ced NR 465.45 c1d ccd 9. a. NR 465.48 c6d ced NR 466.09 c6d NR 466.24 c3d cfd 3.
c24gd 40 CFR part 63, Subpart MMMM, Appendix A	Alternative Capture Efficiency and Destruction Efficiency Measurement and Monitoring Procedures for Magnet Wire Coating Operations	NR 465 subch. V
c24md 40 CFR part 63, Subpart DDDDD, Appendix A	Methodology and Criteria for Demonstrating Eligibility for the Health-Based Compliance Alternatives	NR 462
c24rd 40 CFR part 63, Subpart PPPP, Appendix A	Determination of Weight Volatile Matter Content and Weight Solids Content of Reactive Adhesives	NR 465 subchs. IV and V
c25d 40 CFR part 63 Appendix A	Test Methods	NR 400.02 c131d NR 419.045 c5d cfd 4. NR 439 NR 460 to 469
c25gd 40 CFR part 63 Appendix C	Determination of the Fraction Biodegraded cF _{bio} d in a Biological Treatment Unit	40 CFR 63.457 c1d NR 464.09 c10d cbd
c25rd 40 CFR part 63 Appendix E	Monitoring Procedure for Nonthoroughly Mixed Open Biological Treatment Systems at Kraft Pulp Mills under Unsafe Sampling Conditions	NR 464.09 c16d ccd
c26d 40 CFR part 72 Appendix D	Calculation of Potential Electric Output Capacity	NR 409.02 c57d
c26md cad 40 CFR part 75 Appendix A	Specifications and Test Procedures	NR 446.07 c3d NR 446.08 c1d cad
cbd 40 CFR part 75, Appendix B	Quality Assurance and Quality Control Procedures	NR 446.07 c3d NR 446.08 c1d cad
cbmd 40 CFR part 75, Appendix E	Optional NO _x Emissions Estimation Protocol for Gas-Fired Peaking Units and Oil-Fired Peaking Units	NR 428.23 c1d cbd 2. e.
ccd 40 CFR part 75, Appendix C	Missing Data Estimation Procedures	NR 446.07 c3d NR 446.08 c1d cad
cdd 40 CFR part 75, Appendix F	Conversion Procedures	NR 428.23 c1d cbd 5. c. and 6. b. and c. NR 446.07 c3d NR 446.08 c1d cad
c27d 40 CFR part 75 Appendices A to I		NR 428 NR 428.23 c1d cbd 1. NR 439 NR 446.18 c1d cad and ccd
c27md 40 CFR part 82, Subpart A, Appendices A and B		NR 405 NR 408
c27sd 40 CFR part 136, Appendix A	Methods for Organic Chemical Analysis of Municipal and Industrial Wastewater	NR 419.045 c5d cfd 3.
c28d 40 CFR part 763 Subpart E, Appendix E, Section 1	Polarized Light Microscopy	NR 447.02 c1d cad and cbd NR 447.02 c16d NR 447.02 c27d NR 447.02 c36d NR 447.09 c1d cad and cbd cintro.d

History: Cr. Register, August, 1991, No. 428, eff. 9-1-91; am. cintro.d, c5d and c6d, renum. c3d to be NR 484.03 c4d and am., renum. c4d and c7d to be c3d and c4d and am. c4d, Register, May, 1992, No. 437, eff. 6-1-92; renum. c2d, c3d cintro.d cad to ccd to be c2d cdd, cintro.d, ccd, cad and cbd and am. c2d cdd, Register, May, 1993, No. 449, eff. 6-1-93; am. cintro.d, c2d cdd, cr. c7d, Register, December, 1993, No. 456, eff. 1-1-94; cr. c1d ccd, Register, June, 1994, No. 462, eff. 7-1-94; r. and recr. Register, February, 1995, No. 470, eff. 3-1-95; cr. c9d, c19d, Register, April, 1995, No. 472, eff. 5-1-95; cr. c13md, c15ed and c15md, Register, June, 1995, No. 474, eff. 7-1-95; am. c9d, Register, September, 1995, No. 477, eff. 10-1-95; am. c18d, cr. c18md, renum. c7d to c21d to be c9d to c27d, cr. c7d and c8d, Register, December, 1995, No. 480, eff. 1-1-96; am. c27d, Register, January, 1997, No. 493, eff. 2-1-97; am. cintro.d, c13d, c16d, c21d and c24d, Register, March, 1997, No. 495, eff. 4-1-97; am. cintro.d, c11d,

c13d, c16d, c23d and c24d, Register, November, 1999, No. 527, eff. 12-1-99; am. c9d, rn. c24d to c27d to be c25d to c28d, cr. c21md and c24d and am. c24d, Register, March, 2000, No. 531, eff. 4-1-00; am. c21d and c27d, Register, January, 2001, No. 541, eff. 2-1-01; CR 00-160: am. c9d and c24d of Table 2, Register August 2001 No. 548, eff. 9-1-01; CR 00-175: am. cintro.d and Table 2 Register March 2002 No. 555, eff. 4-1-02; CR 02-146: cr. c21sd Register October 2003 No. 574, eff. 11-1-03; CR 03-037: am. Table 2 c9d and c24d Register March 2004 No. 579, eff. 4-1-04; CR 02-097: am. c23d, Register June 2004 No. 582, eff. 7-1-04; CR 01-081: cr. c20md and c26md Register September 2004 No. 585, eff. 10-1-04; CR 03-066: am. c2d and c4d, cr. c4md Register May 2005 No. 593, eff. 6-1-05; CR 05-040: am. cintro.d, c9d and c24d, cr. c24gd and c24rd Register February 2006 No. 602, eff. 3-1-06; CR 05-116: am. c15d, c18d and c20md, cr. c24md Register November 2006 No. 611, eff. 12-1-06; CR 03-118: am. c21d, cr. c27md, Register June 2007 No. 618, eff. 7-1-07; CR 07-016: am. c13d, c21md, c26md cdd and c27d, cr. c15md, c16md and c26md cbmd Register July 2007 No. 619, eff. 8-1-07; CR 07-045: am. c9d, c21md and c24d Register April 2008 No. 628, eff. 5-1-08; CR 07-017: cr. c11md Register June 2008 No. 630, eff. 7-1-08; CR 07-036: am. c20md, c26md cad to cdd and c27d, cr. c20sd and c20td Register November 2008 No. 635, eff. 12-1-08; CR 07-105: am. c16d Register December 2008 No. 636, eff. 1-1-09; CR 08-102: am. c16d, c19d and c20d Register July 2009 No. 643, eff. 8-1-09; CR 08-104: am. c16d, c19d and c20d Register July 2009 No. 643, eff. 8-1-09; corrections in c16d, c19d and c20d made under s. 13.92 c4d cbd 7., Stats., Register July 2009 No. 643; CR 07-082: am. c6d, cr. c6gd and c6rd Register September 2009 No. 645, eff. 10-1-09; CR 09-088: am. c3d, cr. c6td and c6vd Register May 2010 No. 653, eff. 6-1-10; CR 10-049: r. c7d Register November 2010 No. 659, 12-1-10; CR 10-050: am. c5d, c6gd Register November 2010 No. 659, eff. 12-1-10; CR 07-082: r. c3d Register November 2011 No. 671, eff. 12-1-11; CR 11-005: am. cintro.d, c13d, c17d, c19d, c20d in Table 2, cr. c20ed, c27sd in Table 2 Register January 2012 No. 673, eff. 2-1-12; CR 15-033: am. cintro.d, cr. c7d, c7md Register July 2016 No. 727, eff. 8-1-16; correction in cintro.d made under s. 35.17, Stats., Register August 2016, No. 728; CR 16-041: am. c6gd, c6rd in Table 2 Register December 2017 No. 744, eff. 1-1-18; CR 21-022: cr. c7sd in Table 2 Register February 2022 No. 794, eff. 3-1-22; CR 23-017: am. c15md in Table 2 Register March 2024 No. 819, eff. 4-1-24.

NR 484.05 National technical information service.
The national technical information service cNTISd documents listed in the first column of Table 3 are incorporated by reference for the corresponding sections of chs. NR 400 to 439 and 445 to 499 in the third column of Table 3.

Note: Copies of these materials are available for inspection in the offices of the department of natural resources and legislative reference bureau, Madison, Wisconsin or may be purchased for personal use from:

National Technical Information Service
5285 Port Royal Road
Springfield VA 22161
1-800-553-6847

Table 3
NTIS Document References

Document Reference	Document Title	Incorporated by Reference For
c1d NTIS Order No. PB 87-100012	Standard Industrial Classification Manual, 1987	NR 400.02 c74d NR 400.02 c86d NR 400.02 c91d NR 400.02 c149d NR 405.02 c8d NR 406.02 c1d NR 407.02 c3d NR 407.02 c4d cintro.d NR 407.05 c4d cbd NR 408.02 c5d NR 410.02 c4d NR 419.045 c1d cad 3. NR 421.02 c3d NR 421.02 c17d NR 422.02 c112d NR 422.095 c1d NR 422.15 c1d cintro.d NR 437.07 c2d cad 4. NR 438.02 c1d NR 445.11 c1d cintro.d NR 465.02 c51d
c2d NTIS Order No. PB-266 227	Recommended Industrial Ventilation Guidelines, U.S. Department of Health, Education, and Welfare, National Institute of Occupational Safety and Health, 1976	NR 421.04 c3d ccd 2.
c3d NTIS Order No. PB 93-192664	Metropolitan Areas, 1993	NR 400.02 c96d
c8d EPA, OAQPS, AP-42	Compilation of Air Pollutant Emission Factors, Volume I: Stationary Point and Area Sources, Fifth Edition, January 1995, as revised by Supplement A cFebruary 1996d, Supplement B cNovember 1996d, Supplement C cNovember 1997d, Supplement D cJuly 1998d, Supplement E cNovember 1999d, Supplement F cOctober 2000d and Update 2001 cDecember 2001d	NR 437.04 c2d cad 6. NR 438.03 c5d cad NR 489.09 c2d cbd
c8gd EPA, OAQPS, AP-42	Compilation of Air Pollutant Emission Factors, Volume II: Mobile Sources, Fourth Edition, September 1985, as revised by Supplement A c1991d	NR 437.04 c2d cad 7.
c8rd EPA, OAQPS, AP-42	Compilation of Air Pollutant Emission Factors, Volume II: Mobile Sources, Fifth Edition, Appendix G c1998d, Appendix H c1995d, Appendix I c1998d, Appendix J c1998d, and Appendix K c1998d	NR 437.04 c2d cad 8.
c9d EPA-450{3-84-014, December 1984	Review of National Emission Standards for Mercury	NR 446.21 c3d cdd Note
c10d EPA-454{R-98-015, September 1997	Fabric Filter Bag Leak Detection Guidance	NR 463.15 c6d cad 2.

c12d	EPA-625{3-89-016	Interim Procedures for Estimating Risks Associated with Exposures to Mixtures of Chlorinated Dibenzop-Dioxins and -Dibenzofurans cCDDs and CDFsd and 1989 Update	NR 463.12 c39d NR 463.166 c4d
c14d	NTIS Order No. DE95003295INZ	Voluntary reporting of greenhouse gases under Section 1605cbd of the Energy Policy Act of 1992 - General Guidelines, October 1994	NR 437.04 c2d cad 17.
c14d	NTIS Order No. DE95003295INZ	Voluntary reporting of greenhouse gases under Section 1605cbd of the Energy Policy Act of 1992 - General Guidelines, October 1994	NR 437.04 c2d cad 17.
c15d	NTIS Order No. DE95003296INZ	Sector-Specific Issues and Reporting Methodologies Supporting the General Guidelines for the Voluntary Reporting of Greenhouse Gases under Section 1605cbd of the Energy Policy Act of 1992, Volume I, Electricity Supply Sector, Residential and Commercial Buildings Sector, and Industrial Sector, October 1994.	NR 437.04 c2d cad 18.
c16d	NTIS Order No. DE95003297INZ	Sector-Specific Issues and Reporting Methodologies Supporting the General Guidelines for the Voluntary Reporting of Greenhouse Gases under Section 1605cbd of the Energy Policy Act of 1992, Volume II, Transportation Sector, Forestry Sector, and Agricultural Sector, October 1994.	NR 437.04 c2d cad 19.
c17d	NTIS Order Nos.: printed - PB2007-100002 CD-ROM - PB2007-500023	North American Industry Classification System United States, 2007	NR 405.02 c22d cad 1. NR 405.07 c4d cad 20. NR 407.02 c4d cbd 20. NR 408.02 c21d ced 5.

History: Cr. cintro.d and c1d, c2d renum. from NR 484.03 c2d and am. [Register, February, 1990, No. 410](#), eff. 3-1-90; cr. c2d to c4d, c6d and c7d, renum. c2d to be c5d, [Register, August, 1991, No. 428](#), eff. 9-1-91; am. c1d, c4d to c6d, renum. c7d cad to ced to be c7d ced to ced and am., cr. c7d cad and cbd, [Register, May, 1992, No. 437](#), eff. 6-1-92; am. c1d, [Register, January, 1993, No. 445](#), eff. 2-1-93; am. c3d, cr. c3d cbd to ced and c8d, [Register, May, 1993, No. 449](#), eff. 6-1-93; cr. c1md, am. c3d cbd, [Register, December, 1993, No. 456](#), eff. 1-1-94; renum. c2d to be c9d and am. [Register, August, 1994, No. 464](#), eff. 9-1-94; r. and recr. [Register, February, 1995, No. 470](#), eff. 3-1-95; r. c6d, c7d, [Register, April, 1995, No. 472](#), eff. 5-1-95; am. c3d, [Register, June, 1995, No. 474](#), eff. 7-1-95; am. c1d, [Register, August, 1995, No. 476](#), eff. 9-1-95; am. c8d, [Register, September, 1995, No. 477](#), eff. 10-1-95; am. c3d, [Register, December, 1995, No. 480](#), eff. 1-1-96; am. c1d, c8d, [Register, January, 1997, No. 493](#), eff. 2-1-97; am. c1d, c3d, c8d, r. and recr. c9d, r. c10d, [Register, November, 1999, No. 527](#), eff. 12-1-99; CR 00-160: am. c1d of Table 3, [Register August 2001 No. 548](#), eff. 9-1-01; CR 02-012: am. c1d and c8d of Table 3, cr. c8gd, c8rd, c14d, c15d and c16d of Table 3, [Register October 2002 No. 562](#), eff. 11-1-02; CR 02-097: am. c1d, [Register June 2004 No. 582](#), eff. 7-1-04; CR 01-081: am. c9d [Register September 2004 No. 585](#), eff. 10-1-04; CR 04-107: am. c1d [Register August 2005 No. 596](#), eff. 9-1-05; CR 07-104: cr. c17d [Register July 2008 No. 631](#), eff. 8-1-08; CR 07-036: am. c9d [Register November 2008 No. 635](#), eff. 12-1-08; CR 04-023: cr. c10d and c12d [Register December 2008 No. 636](#), eff. 1-1-09; CR 11-005: am. c1d in Table 3 [Register January 2012 No. 673](#), eff. 2-1-12; CR 15-077: r. c4d, c5d [Register July 2016 No. 727](#), eff. 8-1-16.

NR 484.06 Other government organizations. The following materials from other government organizations listed in the first column of Tables 4A to 4G are incorporated by reference for the corresponding sections of chs. [NR 400 to 439](#) and [445 to 499](#) in the third column of Tables 4A to 4G.

Note: Copies of these materials are available for inspection in the offices of the

department of natural resources and legislative reference bureau, Madison, Wisconsin or may be purchased for personal use by writing to the organizations listed in the individual subsections.

c1d The following is a document published in the federal register.

Note: Copies can be made for personal use from the federal register on microfiche, which is available at the department of natural resources library.

**Table 4A
Federal Register Document Reference**

Citation	Title	Incorporated by Reference For
51 FR 43814, Dec. 4, 1986	Emissions Trading Policy Statement; General Principles for Creation, Banking, and Use of Emission Reduction Credits	NR 408.06 c1d cdd Note NR 425.05 c1d cbd 2.

c2d The following is a document from the U.S. bureau of mines.

Note: Copies may be purchased for personal use from:
Bureau of Mines
U.S. Department of the Interior
Washington DC 20240

**Table 4B
U.S. Bureau Of Mines Document Reference**

Document Number	Title	Incorporated by Reference For
Information Circular 7588	Fundamentals of Smoke Abatement, December, 1950, Ringlemann Chart	NR 400.02 c137d Note

c3d The following document is from the federal highway administration.

Note: Copies may be purchased for personal use from:
Superintendent of Documents
PO Box 371954
Pittsburgh PA 15250-7954

Table 4C
Federal Highway Administration Document Reference

Document Number	Title	Incorporated by Reference For
FP-92, 1992	Standard Specifications for Construction of Roads and Bridges on Federal Highway Projects, Section 401	NR 447.04 c2d ccd

c4d The following are from the U.S. environmental protection agency.

Note: Paragraph cad lists a database document. Electronic copies may be downloaded for personal use from the following internet address:

http://www.knu.ac.kr/epa/ebtpages/Air/Air_Pollution/site-out/s2out8.html

Those without access to a computer can obtain printed copies of all or of specific parts of FIRE from:

Department of Natural Resources
Bureau of Air Management
Box 7921
101 South Webster Street
Madison WI 53707-7921

Note: Copies of the documents listed in par. cbd may be downloaded for personal use from the following internet address:
<http://www.epa.gov/ttn/chieff/eiip/techreport/index.html>.

Those without access to a computer can obtain printed copies from:
Info CHIEF

Emission Factor And Inventory Group cMD-D205-01d
Office of Air Quality Planning and Standards
U. S. Environmental Protection Agency
Research Triangle Park NC 27711
Phone: c919d 541-1000
Fax: c919d 541-5680

Note: Copies of the document listed in par. ccd may be downloaded from the internet for personal use from <http://www.epa.gov/ttn/emc/cem/tribo.pdf>. Copies of the documents listed in par. ced may be downloaded from the internet for personal use from <http://www3.epa.gov/epawaste/hazard/testmethods/sw846/online/index.htm>.

Those without access to a computer can obtain printed copies of these documents from:

National Technical Information Service
5285 Port Royal Road
Springfield VA 22161

Note: The wastewater treatment model listed in par. cfd, along with supporting documentation, may be downloaded for personal use from <https://www.epa.gov/air-emissions-inventories/emission-inventory-improvement-program-eiip>. EPA contact information is also listed at this internet site.

Table 4D
U.S. Environmental Protection Agency Document References

Document Number	Title	Incorporated by Reference For
cad EPA, OAQPS, FIRE 6.23	Factor Information Retrieval Data System, Version 6.23	NR 437.04 c2d cad 22.
cbd EPA, EIIP Technical Report Series		
1. EPA-454{R-97-004a	EIIP Volume I, Introduction and Use of EIIP Guidance for Emission Inventory Development, July 1997	NR 437.04 c2d cad 9.
2. Volume II	Point Sources, May 2002	NR 437.04 c2d cad 10.
3. Volume III	Area Sources and Area Source Method Abstracts, June 2001	NR 437.04 c2d cad 11.
4. Volume IV	Mobile Sources, September 1997	NR 437.04 c2d cad 12.
5. Volume VI	Quality Assurance Procedures and DARS Software, September 1997	NR 437.04 c2d cad 13.
6. Volume VII	Data Management Procedures, January 1999	NR 437.04 c2d cad 14.
7. Volume VIII	Estimating Greenhouse Gas Emissions, October 1999	NR 437.04 c2d cad 15.
8. Volume IX	Particulate Emissions, September 1999	NR 437.04 c2d cad 16.
ccd EPA-454{R-98-015, September 1997	Fabric Filter Bag Leak Detection Guidance	NR 462.05 c6d cid NR 463.23 c3d cbd 4.
cdd EPA-453{R-01-005	National Emission Standards for Hazardous Air Pollutants for Integrated Iron and Steel Plants--Background Information for Proposed Standards	NR 462.01 c4d ckd
ced EPA, SW-846	Test Methods for Evaluating Solid Waste, Physical{Chemical Methods, Third Edition, September 1986, as amended by Updates I, II, IIA, IIB, III, IIIA, IIIB, IVA, and IVB	NR 419.045 c5d cfd 1. and 2. NR 462 Table 6 NR 463.22 c16d
cfd N{A	WATER9, Version 2.0	NR 419.045 c3d cbd 2. c.
cgd EPA-450{4-91-031	Control of Volatile Organic Compound Emissions from Reactor Processes and Distillation Operations Processes in the Synthetic Organic Chemical Manufacturing Industry	NR 421.07 c1d cad 1.

c5d The following are documents from the State of California, Department of Consumer Affairs, Bureau of Home Furnishings and Thermal Insulation.

Note: Copies may be downloaded for personal use from the following Internet address: <http://www.bearhfti.ca.gov/industry/bulletin.shtml>.

Those without access to a computer can obtain printed copies from:

State of California
Department of Consumer Affairs
Bureau of Home Furnishings and Thermal Insulation
3485 Orange Grove Avenue
North Highlands CA 95660-5595
c916d 920-6951

Table 4E
State of California Document Reference

Document Number	Title	Incorporated by Reference For
cad Technical Bulletin 116	Requirements, Test Procedure and Apparatus for Testing the Flame Retardance of Upholstered Furniture	NR 465.04 c1d cbd 1.
cbd Technical Bulletin 117	Requirements, Test Procedure and Apparatus for Testing the Flame Retardance of Resilient Filling Materials Used in Upholstered Furniture	NR 465.04 c1d cbd 1.
ccd Technical Bulletin 133	Flammability Test Procedure for Seating Furniture for Use in Public Occupancies	NR 465.04 c1d cbd 1.

c6d The following document is from the Intergovernmental Panel on Climate Change.

Note: Copies may be downloaded for personal use from the following internet address: <http://www.ipcc-nggip.iges.or.jp/public/gl/invs1.htm>. Those without access to a computer can obtain printed copies from: IPCC Secretariat

C{O World Meteorological Organization
7bis Avenue de la Paix
C.P. 2300
CH- 1211 Geneva 2, Switzerland
Phone: +41-22-730-8208
Fax: +41-22-730-8025
e-mail: ipcc_sec@gateway.wmo.ch

Table 4F
IPCC Document Reference

Publishing Organization	Title	Incorporated by Reference For
Intergovernmental Panel on Climate Change cIPCCd	Revised 1996 IPCC Guidelines for National Greenhouse Gas Inventories, Volumes 1-3	NR 437.04 c2d cad 4.

c7d The following document is from the U.S. department of energy.

Note: Copies may be downloaded for personal use from the following internet address: <http://www.ipmvp.org/info/Vol1book.pdf>. Those without access to a computer can obtain printed copies from:

Energy Efficiency and Renewable Energy Clearinghouse cERECd
NCI, 8260 Greensboro Dr., Suite 400
McLean VA 22102
Phone: c703d 287-8385
Fax: c703d 893-0400
or
Phone: 1-800-DOE-EREC

Table 4G
U.S. Department of Energy Document Reference

Publishing Organization	Title	Incorporated by Reference For
U.S. Department of Energy, OEERE	International Performance Measurement and Verification Protocol, Volume 1 - Concepts and Options for Determining Energy Savings, January 2001	NR 437.04 c2d cad 5.

History: Cr. Register, February, 1995, No. 470, eff. 3-1-95; am. c1d, Register, December, 1996, No. 492, eff. 1-1-97; am. c2d, cr. c4d, Register, November, 1999, No. 527, eff. 12-1-99; CR 00-160: am. cintro.d, cr. c5d, Register August 2001 No. 548, eff. 9-1-01; CR 02-012: am. cintro.d, c4d and cad and cbd of Table 4, cr. c6d and Table 4F, c7d and Table 4G Register October 2002 No. 562, eff. 11-1-02; CR 05-116: cr. c4d ccd to ced of Table 4D Register November 2006 No. 611, eff. 12-1-06; CR 06-110: am. c4d ced and ced, Register July 2007 No. 619, eff. 8-1-07; CR 11-005: am. c4d ced in Table 4D, cr. c4d cfd, cgd in Table 4D Register January 2012 No. 673, eff. 2-1-12; CR 21-072: am. c4d cad in Table 4D Register July 2022 No. 799, eff. 8-1-22.

NR 484.10 American Society for Testing and Materials. The American Society for Testing and Materials cASTM standards listed in the first column of Table 5 are incorporated by reference for the corresponding sections of chs. NR 400 to 439 and 445 to 499 in the third column of Table 5. Some standards are incorporated into other documents which are separately incorporated by reference in this chapter. Those documents are also listed in the third column of Table 5.

Note: These materials are available for inspection in the offices of the department of natural resources and legislative reference bureau, Madison, Wisconsin or may be purchased for personal use at one of the following addresses:

American Society for Testing and Materials cASTM
100 Barr Harbor Drive
W Conshohocken PA 19428-2959
Telephone: c610d 832-9585
Fax: c610d 832-9555
E-mail: service@astm.org
Website <http://www.astm.org>
or from:
IHS Global Engineering Documents
15 Inverness Way East
Englewood, CO 80112
Telephone: c800d 854-7179
E-mail: globalcustomerservice@ihs.com
Website: <http://global.ihs.com>

Table 5
ASTM Standard References

Standard Number	Standard Title	Incorporated by Reference For	
c1d	ASTM C136-01	Standard Test Method for Sieve Analysis of Fine and Coarse Aggregates	NR 415.02 c9d
c2d	ASTM D97-02	Standard Test Methods for Pour Point of Petroleum Products	NR 420.02 c41d
c3d	ASTM D129-00 c2005d	Standard Test Method for Sulfur in Petroleum Products cGeneral Bomb Methodd	40 CFR part 60 Appendix A, Method 19 40 CFR part 75 Appendices A and D NR 439.08 c2d cbd
c4d	ASTM D240-02	Standard Test Method for Heat of Combustion of Liquid Hydrocarbon Fuels by Bomb Calorimeter	40 CFR part 60 Appendix A, Method 19 40 CFR part 75 Appendices A, D, E, and F NR 400.02 c79d NR 439.08 c2d ccd
c5d	ASTM D287-92 c2000d	Standard Test Method for API Gravity of Crude Petroleum and Petroleum Products cHydrometer Methodd	40 CFR part 75 Appendix D
c6d	ASTM D323-08	Standard Test Method for Vapor Pressure of Petroleum Products cReid Methodd	NR 419.045 c5d cdd NR 420.02 c31d
c7d	ASTM D388-99e1 c2004d	Standard Classification of Coals by Rank	40 CFR part 75 Appendix F NR 400.02 c40d NR 462.02 c6d
c8d	ASTM D396-02a	Standard Specification for Fuel Oils	NR 400.02 c70d NR 400.02 c135d NR 420.03 c1d cad NR 462.02 c11d and c41d
c9d	ASTM D523-89 c1999d	Standard Test Method for Specular Gloss	ANSI A135.5-2004 NR 422.02 c26d, c41sd, and c49md
c10d	ASTM D737-96	Standard Test Method for Air Permeability of Textile Fabrics	NR 447.15 c1d cad 1.
c12d	ASTM D968-93 c2001d	Standard Test Methods for Abrasion Resistance of Organic Coatings by Falling Abrasive	ANSI A135.5-2004
c13d	ASTM D975-02	Standard Specification for Diesel Fuel Oils	NR 409.02 c34d NR 420.03 c1d cad
c14d	ASTM D1037-99	Standard Test Methods for Evaluating Properties of Wood-Base Fiber and Particle Panel Materials	ANSI A135.4-2004 ANSI A135.5-2004
c15d	ASTM D1072-90 c1999d	Standard Test Method for Total Sulfur in Fuel Gases	40 CFR part 75 Appendix D
c16d	ASTM D1193-99	Standard Specification for Reagent Water	40 CFR part 60 Appendix A: Method 5, par. 7.1.3 Method 5E, par. 7.2.1 Method 5F, par. 7.2.1 Method 6, par. 7.1.1 Method 7, par. 7.1.1 Method 7C, par. 7.1.1 Method 7D, par. 7.1.1 Method 10A, par. 7.1.1 Method 11, par. 7.1.3 Method 12, par. 7.1.3 Method 13A, par. 7.1.2 Method 14A, par. 7.1 Method 25D, par. 7.2.2.4 Method 26, par. 7.1.2 Method 26A, par. 7.1.2 Method 29, pars. 7.2.2, 7.4.2 and 7.5.6 40 CFR part 61 Appendix B, Method 101, par. 6.1.1
c17d	ASTM D1217-93 c1998d	Standard Test Method for Density and Relative Density cSpecific Gravityd of Liquids by Bingham Pycnometer	40 CFR part 75 Appendix D

Table 5 (Continued)
ASTM Standard References

Standard Number	Standard Title	Incorporated by Reference For	
c18d	ASTM D1250-80 c1997d	Standard Guide for Petroleum Measurement Tables	40 CFR part 75 Appendix D
c20d	ASTM D1298-99	Standard Practice for Density, Relative Density cSpecific Gravityd, or API Gravity of Crude Petroleum and Liquid Petroleum Products by Hydrometer Method	40 CFR part 75 Appendix D
c21d	ASTM D1308-02	Standard Test Method for Effect of Household Chemicals on Clear and Pigmented Organic Finishes	ANSI A135.5-2004
c22d	ASTM D1475-98 c2003d	Standard Test Method for Density of Liquid Coatings, Inks, and Related Products	40 CFR part 60 Appendix A: Method 24, par. 6.1 Method 24A, pars. 6.5 and 7.1 NR 465.26 c2d cbd 3. and ccd NR 465.37 c2d ccd NR 465.46 c2d cbd 4. and ccd NR 465.47 c2d ccd
c23d	ASTM D1480-93 c1997d	Standard Test Method for Density and Relative Density cSpecific Gravityd of Viscous Materials by Bingham Pycnometer	40 CFR part 75 Appendix D
c24d	ASTM D1481-93 c1997d	Standard Test Method for Density and Relative Density cSpecific Gravityd of Viscous Materials by Lipkin Bicapillary Pycnometer	40 CFR part 75 Appendix D
c25d	ASTM D1552-03	Standard Test Method for Sulfur in Petroleum Products cHigh-Temperature Methodd	40 CFR part 75 Appendices A and D NR 439.08 c2d cbd
c25md	ASTM D1613-02	Standard Test Method for Acidity in Volatile Solvents and Chemical Intermediates Used in Paint, Varnish, Lacquer, and Related Products	NR 422.02 c67md, 422.084 c2d ccd, and 422.151 c2d cbd and ccd
c26d	ASTM D1826-94 c1998d	Standard Test Method for Calorific Value of Gases in Natural Gas Range by Continuous Recording Calorimeter	40 CFR part 60 Appendix A, Method 19 40 CFR part 75 Appendices E and F NR 400.02 c79d
c26md	ASTM D1835-03a	Standard Specification for Liquid Petroleum Gases	NR 462.02 c36d cbd
c27d	ASTM D1945-96 c2001d	Standard Test Method for Analysis of Natural Gas by Gas Chromatography	40 CFR part 75 Appendices F and G
c28d	ASTM D1946-90 c2000d	Standard Practice for Analysis of Reformed Gas by Gas Chromatography	40 CFR part 75 Appendices F and G NR 460.10 c2d cfd 1. a.
c30d	ASTM D2013-01	Standard Method of Preparing Coal Samples for Analysis	40 CFR part 60 Appendix A, Method 19 40 CFR part 75 Appendix F NR 439.08 c1d cbd NR 462, Table 6
c31d	ASTM D2015-96	Standard Test Method for Gross Calorific Value of Coal and Coke by the Adiabatic Bomb Calorimeter	40 CFR part 60 Appendix A, Method 19 40 CFR part 75 Appendices A, D, E and F
c32d	ASTM D2197-98 c2002d	Standard Test Method for Adhesion of Organic Coatings by Scrape Adhesion	ANSI A135.5-2004
c33d	ASTM D2234{D2234M-03e1	Standard Practice for Collection of a Gross Sample of Coal	40 CFR part 60 Appendix A, Method 19 40 CFR part 75 Appendix F NR 439.08 c1d cad NR 439.085 c2d cad 1. NR 439.085 c2d cbd 1. NR 439.085 c2d ccd 1. NR 462, Table 6

Table 5 (Continued)
ASTM Standard References

Standard Number	Standard Title	Incorporated by Reference For
c33d ASTM D2234{D2234M-03e1	Standard Practice for Collection of a Gross Sample of Coal	40 CFR part 60 Appendix A, Method 19 40 CFR part 75 Appendix F NR 439.08 c1d cad NR 439.085 c2d cad 1. NR 439.085 c2d cbd 1. NR 439.085 c2d ccd 1. NR 462, Table 6
c34d ASTM D2369-01e1	Standard Test Method for Volatile Content of Coatings	40 CFR part 60 Appendix A, Method 24, par. 6.2
Note: ASTM D2382 was discontinued in 1994, and replaced by ASTM D4809.		
c36d ASTM D2486-00	Standard Test Method for Scrub Resistance of Wall Paints	ANSI A135.5-2004
c37d ASTM D2502-92 c1996d	Standard Test Method for Estimation of Molecular Weight cRelative Molecular Massd of Petroleum Oils from Viscosity Measurements	40 CFR part 75 Appendix G
c38d ASTM D2503-92 c1997d	Standard Test Method for Relative Molecular Mass cMolecular Weightd of Hydrocarbons by Thermo-electric Measurement of Vapor Pressure	40 CFR part 75 Appendix G
c39d ASTM D2622-98	Standard Test Method for Sulfur in Petroleum Products by Wavelength Dispersive X-ray Fluorescence Spectrometry	40 CFR part 75 Appendices A and D
c39ed ASTM D2697-86 c1998d	Standard Test Method for Volume Nonvolatile Matter in Clear or Pigmented Coatings	NR 465.26 c2d cbd 1. NR 465.46 c2d cbd 1.
c39md ASTM D2879-10	Standard Test Method for Vapor Pressure-Temperature Relationship and Initial Decomposition Temperature of Liquids by Isoteniscope	NR 419.045 c5d cdd NR 422.142 c5d cdd
c40d ASTM D2880-00	Standard Specification for Gas Turbine Fuel Oils	NR 420.03 c1d cad
c41d ASTM D2986-95a c1999d	Standard Practice for Evaluation of Air Assay Media by the Monodisperse DOP cDiocetyl Phthalated Smoke Test	40 CFR part 60 Appendix A: Method 5, par. 7.1.1 Method 12, par. 7.1.1 Method 13A, par. 7.1.1.2
c41md ASTM D3172-89 c2002d	Standard Practice for Proximate Analysis of Coal and Coke	NR 439.098 c1d cbd
c42d ASTM D3173-02	Standard Test Method for Moisture in the Analysis Sample of Coal and Coke	40 CFR part 60 Appendix A, Method 19 NR 439.08 c1d cfd NR 462, Table 6
c43d ASTM D3174-04	Standard Test Method for Ash in the Analysis Sample of Coal and Coke from Coal	40 CFR part 75 Appendix G NR 439.08 c1d ced
c44d ASTM D3176-89 c2002d	Standard Practice for Ultimate Analysis of Coal and Coke	40 CFR part 75 Appendices A and F NR 439.08 c1d cgd NR 439.098 c1d cad
c45d ASTM D3177-02	Standard Test Methods for Total Sulfur in the Analysis Sample of Coal and Coke	40 CFR part 60 Appendix A, Method 19 40 CFR part 75 Appendix A NR 439.08 c1d ccd
c46d ASTM D3178-89 c1997d	Standard Test Methods for Carbon and Hydrogen in the Analysis Sample of Coal and Coke	40 CFR part 75 Appendix G
c47d ASTM D3238-95 c2000d	Standard Test Method for Calculation of Carbon Distribution and Structural Group Analysis of Petroleum Oils by the n-d-M Method	40 CFR part 75 Appendix G
c47Ld ASTM D3683-94 c2000d	Standard Test Method for Trace Elements in Coal or Coke Ash by Atomic Absorption	NR 462, Table 6

Table 5 (Continued)
ASTM Standard References

Standard Number	Standard Title	Incorporated by Reference For
c47md ASTM D3684-01	Standard Test Method for Total Mercury in Coal by Oxygen Bomb Combustion{Atomic Absorption Method	NR 446.04 c1d cbd NR 446.04 c1d ccd 1. b. NR 446.07 c1d NR 446.07 c2d NR 446.08 c1d cbd NR 446.08 c1d ccd 2. NR 462, Table 6
c48d ASTM D3792-99	Standard Test Method for Water Content of Water-Reducible Paints by Direct Injection into a Gas Chromatograph	40 CFR part 60 Appendix A, Method 24, par. 6.3
c49d ASTM D4017-02	Standard Test Method for Water in Paints and Paint Materials by Karl Fischer Method	40 CFR part 60 Appendix A, Method 24, par. 6.4
c50d ASTM D4052-96 c2002d	Standard Test Method for Density and Relative Density of Liquids by Digital Density Meter	40 CFR part 75 Appendix D
c51d ASTM D4057-95 c2000d	Standard Practice for Manual Sampling of Petroleum and Petroleum Products	40 CFR part 75 Appendix D NR 439.08 c2d cad
c52d ASTM D4177-95 c2000d	Standard Practice for Automatic Sampling of Petroleum and Petroleum Products	40 CFR part 75 Appendix D NR 439.08 c2d cad
c53d ASTM D4239-04a	Standard Test Methods for Sulfur in the Analysis Sample of Coal and Coke Using High Temperature Tube Furnace Combustion Methods	40 CFR part 60 Appendix A, Method 19 40 CFR part 75 Appendix A NR 439.08 c1d ccd
c54d ASTM D4294-03	Standard Test Method for Sulfur in Petroleum and Petroleum Products by Energy-Dispersive X-Ray Fluorescence Spectrometry	40 CFR part 75 Appendices A and D NR 439.08 c2d cbd
c55d ASTM D4809-00	Standard Test Method for Heat of Combustion of Liquid Hydrocarbon Fuels by Bomb Calorimeter cPrecision Methodd	40 CFR part 75 Appendices D, E and F NR 460.10 c2d cfd 2.
c55bd ASTM D4953-06	Standard Test Method for Vapor Pressure of Gasoline and Gasoline-Oxygenate Blends cDry Methodd	NR 419.045 c5d cdd
c55bgd ASTM D5190-07	Standard Test Method for Vapor Pressure of Petroleum Products cAutomatic Methodd	NR 419.045 c5d cdd
c55brd ASTM D5191-10b	Standard Test Method for Vapor Pressure of Petroleum Products cMini Methodd	NR 419.045 c5d cdd
c55gd ASTM D5865-04	Standard Test Method for Gross Calorific Value of Coal and Coke	NR 400.02 c79d NR 439.08 c1d cdd
c55id ASTM D5965-02	Standard Test Methods for Specific Gravity of Coating Powders	NR 465.47 c2d ccd
c55Ld ASTM D6053-00	Standard Test Method for Determination of Volatile Organic Compound cVOCd Content of Electrical Insulating Varnishes	40 CFR part 63, Subpart MMMM, Appendix A
c55md ASTM D6093-97 c2003d	Standard Test Method for Percent Volume Non-volatile Matter in Clear or Pigmented Coatings Using a Helium Gas Pycnometer	NR 465.26 c2d cbd 1. NR 465.46 c2d cbd 1.
c55pd ASTM D6323-98 c2003d	Standard Guide for Laboratory Subsampling of Media Related to Waste Management Activities	NR 462, Table 6
c55td ASTM D6522-00	Standard Test Method for Determination of Nitrogen Oxides, Carbon Monoxide, and Oxygen Concentrations in Emissions from Natural Gas-Fired Reciprocating Engines, Combustion Turbines, Boilers and Process Heaters Using Portable Analyzers	NR 462, Table 5
c55vd ASTM D6751-09	Standard Specification for Biodiesel Fuel Blend Stock cB100d for Middle Distillate Fuels	NR 406.02 c1d
c55xd ASTM D6784-02	Standard Test Method for Elemental, Oxidized, Particle-Bound and Total Mercury in Flue Gas Generated from Coal-Fired Stationary Sources cOntario Hydro Methodd	NR 462, Table 5

Table 5 (Continued)
ASTM Standard References

Standard Number	Standard Title	Incorporated by Reference For	
c55cd	ASTM D5291-02	Standard Test Methods for Instrumental Determination of Carbon, Hydrogen, and Nitrogen in Petroleum Products and Lubricants	40 CFR part 63, Subpart MMMM, Appendix A
c56d	ASTM E84-03	Standard Test Method for Surface Burning Characteristics of Building Materials	ANSI A135.5-2004
c56dd	ASTM E711-87 c2004d	Standard Test Method for Gross Calorific Value of Refuse-Derived Fuel by the Bomb Calorimeter	NR 462, Table 6
c56hd	ASTM E776-87 c2004d	Standard Test Method for Forms of Chlorine in Refuse-Derived Fuel	NR 462, Table 6
c56md	ASTM E145-94 c2001d	Standard Specification for Gravity-Convection and Forced-Ventilation Ovens	40 CFR part 63, Subpart PPPP, Appendix A
c56pd	ASTM E871-82 c1998d	Standard Method of Moisture Analysis of Particulate Wood Fuels	NR 462, Table 6
c56td	ASTM E885-88 c2004d	Standard Test Methods for Analyses of Metals in Refuse-Derived Fuel by Atomic Absorption Spectroscopy	NR 462, Table 6
c57d	ASTM G23-96	Standard Practice for Operating Light-Exposure Apparatus cCarbon-Arc Typed With and Without Water for Exposure of Nonmetallic Materials	ANSI{AHA A135.5-1988

History: Renum. from NR 484.06 c4d and am., [Register, February, 1995, No. 470](#), eff. 3-1-95; am. c1d, c3d, c7d, c8d, c15d, c39d, c51d, c54d, cr. c12md, c19d, [Register, April, 1995, No. 472](#), eff. 5-1-95; cr. c39md, [Register, June, 1995, No. 474](#), eff. 7-1-95; am. c12d, c17d, c23d, c24d, c26d, c29d to c31d, c34d, c40d, c43d to c46d, c53d, c55d and c56d, r. c11d, [Register, January, 1997, No. 493](#), eff. 2-1-97; am. cintro.d, c28d and c35d, [Register, March, 1997, No. 495](#), eff. 4-1-97; am. cintro.d, c1d to c10d, c13d to c16d, c18d, c19d, c21d, c22d, c24d, c25d to c29d, c31d, c32d, c33d, c34d, c36d, c37d, c39d to c42d, c44d, c47d to c52d, c54d, r. c12md, c35d, renum. and am. c55d and c56d to be c56d and c57d and cr. c41md and c55d, [Register, November, 1999, No. 527](#), eff. 12-1-99; am. c9d, cr. c25md, [Register, January, 2001, No. 541](#), eff. 2-1-01; [CR 00-175](#): am. cintro.d and Table 5 [Register March 2002 No. 555](#), eff. 4-1-02; [CR 02-146](#): am. c1d, c2d, c4d, c6d to c8d, c12d, c13d, c21d, c25d, c25md, c27d to c34d, c40d, c41md, c44d, c45d, c49d to c51d, c53d, c54d and c55gd [Register October 2003 No. 574](#), eff. 11-1-03; [CR 03-037](#): am. Table 5 c22d, and cr. c39ed and c55md [Register March 2004 No. 579](#), eff. 4-1-04; [CR 01-081](#): am. c47md [Register September 2004 No. 585](#), eff. 10-1-04; [CR 05-040](#): am. cintro.d, c22d, c39ed and c55md, cr. c55cd, c55id, c55Ld and c56md, [Register February 2006 No. 602](#), eff. 3-1-06; [CR 05-116](#): am. c3d, c7d, c8d, c30d, c33d, c42d and c47md, cr. c26md, c47Ld, c55pd, c55td, c55xd, c56dd, c56hd, c56pd and c56td [Register November 2006 No. 611](#), eff. 12-1-06; [CR 07-036](#): am. c47md [Register November 2008 No. 635](#), eff. 12-1-08; [CR 08-102](#): am. c9d, c12d, c14d, c21d, c32d, c36d, c56d [Register July 2009 No. 643](#), eff. 8-1-09; [CR 09-020](#): cr. c55vd [Register January 2010 No. 649](#), eff. 2-1-10; [CR 11-005](#): am. c6d, c39md in Table 5, cr. c55bd, c55gd, c55brd in Table 5 [Register January 2012 No. 673](#), eff. 2-1-12; [CR 20-088](#): am. c9d, c25md in Table 5 [Register May 2022 No. 797](#), eff. 6-1-22.

NR 484.11 Other private organizations. The following materials from other private organizations listed in the first column of Tables 6A to 6K are incorporated by reference for the corresponding sections of chs. [NR 400 to 439](#) and [445 to 499](#) listed in the third column of Tables 6A to 6K. Some of the materials are incorporated into other documents which are separately incorporated by reference in this chapter. Those documents are also listed in the third column of Tables 6A to 6K.

Note: Copies of these materials are available for inspection in the offices of the department of natural resources and legislative reference bureau, Madison, Wisconsin or may be purchased for personal use by writing to the organizations listed in the individual subsections.

c1d The following is a document from the American Architectural Manufacturers Association cAAMAd.

Note: Copies may be purchased for personal use from:
American Architectural Manufacturers Association
1827 Walden Office Square Suite 104
Schaumburg IL 60173-4628

Table 6A
AAMA Document Reference

Document Number	Title	Incorporated by Reference For
AAMA 2604-02	Voluntary Specification, Performance Requirements and Test Procedures for High Performance Organic Coatings On Aluminum Extrusions and Panels	NR 422.02 c42d NR 465.42 c21d

c2d The following are documents from the American Conference of Governmental Industrial Hygienists cACGIHd.

Note: Copies may be purchased for personal use from:
American Conference of Governmental Industrial Hygienists
Technical Information Office
1330 Kemper Meadow Dr
Cincinnati OH 45240

Table 6B
ACGIH Document References

	Document Number	Title	Incorporated by Reference For
cad	ISBN:0-936712-72-4	Threshold Limit Values and Biological Exposure Indexes for 1987-1988	NR 445.04 c1d cad 1. NR 445.04 c1d cad 2. NR 445.04 c1d cbd NR 445.04 c2d cad NR 445.04 c2d cbd NR 445.04 c3d ccd 6. NR 445.05 c1d cad 1. NR 445.05 c1d cad 2. NR 445.05 c1d cbd NR 445.05 c2d cad NR 445.05 c2d cbd NR 445.05 c3d ccd 7.
cbd	ISBN:0-936712-86-4	1990-1991 Threshold Limit Values for Chemical Substances and Physical Agents and Biological Exposure Indexes	NR 445.04 c4d cad 1. NR 445.04 c4d cad 2. NR 445.04 c4d cbd NR 445.04 c4rd cbd 4. NR 445.05 c4d cad 1. NR 445.05 c4d cad 2. NR 445.05 c4d cbd NR 445.05 c4rd cbd 4.
ccd	ISBN: 1-882417-36-4	2000 Threshold Limit Values for Chemical Substances and Physical Agents and Biological Exposure Indices	NR 445.07 c1d cbd cintro.d NR 445.07 c5d cdd 2. NR 445.15 c3d
cdd		Industrial Ventilation: A Manual of Recommended Practice, 23th ed., 1998	NR 421.04 c3d ccd 1. NR 460 Appendix RRR NR 463.14, Table 2 NR 463.14 c3d cad

c3d The following is a document from the American Gas Association cAGAd laboratories.

Note: Copies may be purchased for personal use from:
American Gas Association Laboratories
8501 East Pleasant Valley Road
Cleveland OH 44131

Table 6C
AGA Laboratories Document Reference

	Document Number	Title	Incorporated by Reference For
	Standard Z21.6 - 1973 with addenda: Z21.6a - 1975, Z21.6b - 1978	American National Standard for Domestic Gas-Fired Incinerators	NR 415.07 c1d cbd 2. NR 415.07 c2d cad 4.

c4d The following are documents from the American National Standards Institute.

Note: Copies may be purchased for personal use from:
Composite Panel Association
19465 Deerfield Avenue, Suite 306
Leesburg, VA 20176
Telephone: c703d 724-1128
Website: <http://www.pbmdf.com>

or from:

HIS Global Engineering Documents
15 Inverness Way East
Englewood, CO 80112
Telephone: c800d 854-7179
E-mail: globalcustomerservice@ihs.com
Website: <http://global.ihs.com>

Table 6D
AHA Document References

	Document Number	Title	Incorporated by Reference For
cad	ANSI A135.4-2004	Basic Hardboard	ANSI A135.5-2004 NR 422.02 c12sd
cbd	ANSI A135.5-2004	Prefinished Hardboard Paneling	NR 422.02 c13d

c5d The following is a document from the American Petroleum Institute cAPId.

Note: Copies may be purchased for personal use from:
American Petroleum Institute
1220 L Street NW
Washington DC 20005

Table 6E
API Document Reference

Document Number	Title	Incorporated by Reference For
Publication 2517	Evaporative Loss from External Floating Roof Tanks, 3rd edition, February 1989	NR 419.045 c5d cdd NR 420.02 c33d NR 420.03 c3d ccd

c6d The following are documents from the American Society of Mechanical Engineers cASMEd:

Note: Copies may be purchased for personal use from:
The American Society of Mechanical Engineers
22 Law Drive
Fairfield NJ 07007-2900
E-mail: infocentral@asme.org
Phone: c973d 882-1170
Fax: c973d 882-5155

Table 6F
ASME Document Reference

Document Number	Title	Incorporated by Reference For
cad PTC 4.2-1969 c1997d	Test Code for Coal Pulverizers	NR 439.098 c1d ccd
cbd PTC 19.10-1981	Flue and Exhaust Gas Analysis	NR 462, Table 5 NR 465.28 c7d cad 3. NR 466.24 c3d ced 1. c.

c7d The following is a document from The Business and Institutional Furniture Manufacturer[s] Association cBIFMAd.

Note: Copies may be purchased for personal use from:
BIFMA International
2680 Horizon Drive SE, Suite A-1
Grand Rapids MI 49546-7500
E-mail: email@bifma.org
Phone: c616d 285-3963
Fax: c616d 285-3765

Table 6G
BIFMA Document Reference

Document Number	Title	Incorporated by Reference For
BIFMA X5.7-1991	Voluntary Upholstered Furniture Flammability Standard for Non-residential, Non-live-in Occupancies	NR 465.04 c1d cbd 1.

c8d The following is a document from the International Organization for Standardization cISOd:

Note: Copies may be purchased for personal use from:
American National Standards Institute
11 West 42nd Street
13th floor
New York NY 10036

Table 6H
ISO Document Reference

Document Number	Title	Incorporated by Reference For
ISO 9931 c1991d	Coal - Sampling of Pulverized Coal Conveyed by Gases in Direct Fired Coal Systems	NR 439.098 c1d ccd

c9d The following is a document from the National Council of the Paper Industry for Air and Stream Improvement, Inc. cNCASId:

Note: Copies may be obtained for personal use from:
National Council of the Paper Industry for Air and Stream Improvement, Inc.
PO Box 13318
Research Triangle Park NC 27709-3318
<http://www.ncasi.org>
c919d 558-1987

Table 6I
NCASI Document Reference

Document Number	Title	Incorporated by Reference For
NCASI Method DI{MEOH-94.02	Methanol in Process Liquids by GC{FID, August 1998, Methods Manual	40 CFR 63.457ccdc3dciid

c10d The following are documents from the Upholstered Furniture Action Council cUFACd.

Note: Copies may be purchased for personal use from:
Upholstered Furniture Action Council
Box 2436
High Point, NC 27261
Phone: c336d 885-5065
Fax: c336d 885-5072

Table 6J
UFAC Document Reference

Document Number	Title	Incorporated by Reference For	
cad	DMTM--1990	Decking Materials Test Method--1990	NR 465.04 c1d cbd 1.
cbd	WCTM--1990	Welt Cord Test Method--1990	NR 465.04 c1d cbd 1.
ccd	IFTM--1990	Interior Fabrics Test Method--1990	NR 465.04 c1d cbd 1.
cdd	F{PCTM--1990, PT A	Filling{Padding Component Test Method--1990 Part A - For Slab or Garnetted Materials	NR 465.04 c1d cbd 1.
ced	F{PCTM--1990, PT B	Filling{Padding Component Test Method--1990 Part B - For Fibrous or Particulate Materials	NR 465.04 c1d cbd 1.
cfid	PTM--1990	Barrier Test Method--1990	NR 465.04 c1d cbd 1.
cgd	FCTM--1990	Fabric Classification Test Method--1990	NR 465.04 c1d cbd 1.
chd	DTTM--1993	Standard Test Methods for Decorative Trims, Edging, and Brush Fringes--1993	NR 465.04 c1d cbd 1.

c11d The following documents are from the World Resources Institute and World Business Council for Sustainable Development.

Note: Copies of the document listed in par. cad may be downloaded for personal use from the following internet address: <http://www.ghgprotocol.org>
Printed copies may be purchased from:
World Resources Institute Publications
PO Box 4852
Hampden Station
Baltimore MD 21211
Phone: 1-800-822-0504
Fax: c410d 516-6998

Note: Copies of the software documents listed in par. cbd may be downloaded for personal use from the following internet address: <http://www.ghgprotocol.org/calculation-tools>

To obtain the software by mail contact:
WRI
10 G Street NE
Washington DC 20002
Phone: c202d 729-7600
Fax: c202d 729-7637

Table 6K
WRI{WBCSD Document Reference

Document Number	Title	Incorporated by Reference For
cad ISBN 2-940240-18-3	The Greenhouse Gas Protocol] a corporate accounting and reporting standard, first edition, September 2001	NR 437.04 c2d cad 20.
cbd N{A	GHG Calculation Tools	NR 437.04 c2d cad 21.

c12d The following document is a joint publication of the American Public Health Association, the American Water Works Association, and the Water Environment Federation.

Note: Copies may be purchased for personal use from:

APHA
Publications Sales
PO Box 933019
Atlanta, GA 31193-3019
Telephone: c888d 361-2742
Website: <http://www.apha.org/publications/pubscontact/>

Table 6L
APHA Document Reference

Document Number	Title	Incorporated by Reference For
N{A	Standard Methods for the Examination of Water and Wastewater, 20th Edition, 1998	NR 419.045 c5d cfd 5.

History: Cr. [Register, February, 1995, No. 470](#), eff. 3-1-95; am. c1d cbd, [Register, April, 1995, No. 472](#), eff. 5-1-95; r. c1d ccd, am. c1d cad, [Register, December, 1995, No. 480](#), eff. 1-1-96; am. c5d, [Register, January, 1997, No. 493](#), eff. 2-1-97; am. c5d, renum. c1d to c5d to be c2d, c3d, c4d, c5d and c1d, cr. c6d and c7d, [Register, November, 1999, No. 527](#), eff. 12-1-99; CR 00-160: renum. c7d and Table 6G to be c8d and Table 6H, cr. c7d and c10d, [Register August 2001 No. 548](#), eff. 9-1-01; CR 00-175: am. cintro.d, cr. c9d and Table 6I [Register March 2002 No. 555](#), eff. 4-1-02; CR 02-012: am. cintro.d, cr. c11d and Table 6K [Register October 2002 No. 562](#), eff. 11-1-02; CR 03-037: am. c6d and Table 6F, cr. c6d cbd [Register March 2004 No. 579](#), eff. 4-1-04; CR 02-097: am. c2d cbd, cr. c2d ccd, [Register June 2004 No. 582](#), eff. 7-1-04; CR 05-040: am. cintro.d and c1d Table 6A [Register February 2006 No. 602](#), eff. 3-1-06; CR 05-116: am. c6d cbd [Register November 2006 No. 611](#), eff. 12-1-06; CR 07-045: am. c6d cbd [Register April 2008 No. 628](#), eff. 5-1-08; CR 04-023: am. c2d cdd [Register December 2008 No. 636](#), eff. 1-1-09; CR 08-102: am. c4d [Register July 2009 No. 643](#), eff. 8-1-09; CR 11-005: am. c5d, cr. c12d [Register January 2012 No. 673](#), eff. 2-1-12.